Docket RM-11828

April 7, 2019

I am writing to express only partial support for the proposed change to Part 97 regulations. Frankly, I am torn between supporting efforts to "modernize" the Technician Class license vs. granting more privileges to those who have not earned them.

I constantly read and hear complaints about how "difficult" it is to obtain an amateur radio license, let alone upgrade to a higher-class license. My view is that the "difficulty" is in expecting instant gratification with minimum effort. But, like all things in life, practice and passion lead to truly rewarding pursuits. As someone who has taught both Technician and General Class courses, I am appalled at the number of one-day cram classes now offered; designed simply to not be too "inconvenient" to the student. These courses essentially offer only rote memorization of the exam questions, rather than an appreciation for the underlying fundamentals or the rationale behind the rules and regulations.

I believe there is now considerable overlap between the Technician and General Class course material. I would suggest that the commission work with the amateur radio community and the NCVEC to come up with modern, meaningful licensing requirements rather than continue to "tinker" with the existing licensing structure.

With regards to incentive licensing and the existing band plans, the current focus within the amateur radio community and the commission is on defining a <u>mode</u> of operation instead of what can be accomplished with finite bandwidth and power. The Shannon-Hartley Theorem, in its elegant simplicity, defines how much information can be conveyed within a specific bandwidth and signal-to-noise ratio. An appreciation for this concept, rather than just relegating amateurs to specific <u>modes of operation</u>, would go a long way in helping to further the radio art. We have seen this in the rapid explosion of new digital modes of communication (FT8, PSK31, etc.) as an alternate to CW. Conversely, no serious attempt has been made to provide similar improvements to voice communication, other than perhaps FREEDV and derivatives of CODEC2.

Restricting a Technician Class operator to only the CW mode of operation is a bit anachronistic, especially since the international requirement for Morse Code has now been eliminated. For this reason, I would recommend that the commission support granting Technician Class operators digital mode privileges within their existing CW allocation.

I would recommend that the commission <u>not</u> grant additional HF spectrum and analog voice privileges to Technician Class operators. Simply adding more AM and SSB operators to the HF spectrum using these less-than-cutting-edge modes does nothing to advance the radio art. Instead, I would encourage Technicians to upgrade to the General Class license so that their understanding of HF propagation, safe and effective use of high-power linear amplifiers, etc. would ultimately convey "full" privileges as with all other General, Advanced and Amateur Extra class operators.

Regards,

Mark D. Braunstein WA4KFZ 14345 Brookmere Drive Centreville, VA 20120-4106